The output from the program was put into the model. It was determined that incremental changes needed to be made in order to further refine the traffic movements. Initially, some trips were re-assigned to other destinations. Finally, the number of through trips were reduced at certain locations until the model was balanced and no further modifications would aid in the calibration.

Internal External Trips - Internal -External trips consist of internal -external trips plus external internal trips. External Internal trips are equal to the external production (\sum ADT) at the cordon - thru trip ends - internal external trips. This volume was determined by first multiplying the total number of internal trips generated by population and development by the employment to population reduction factor to get the total number of internal internal trips. The total number of internal internal trips is then subtracted from the total number of internal trips generated by population and development to get the total internal external trips. The employment to population reduction factor increases as the ratio of employment to population decreases. Thus, as the factor increases the number of internal external trips decreases. (See page 2 of Trip Generation Worksheet.)

Internal Trips - The number of internal trips is the difference between the total number of trips generated by population and development and the total number of internal-external trips.

NonHome Based Secondary Trips - Non Home based secondary trips are calculated from the external-internal trips. These secondary trips are trips that are housed outside the planning area, but come inside to work or shop. While these trips are visiting the planning area, they make additional trips like to a restaurant for lunch if they come inside the planning area to work.

Internal Trip Distribution

Once the number of internal trips per traffic zone were determined, the trips were distributed to other traffic zones. This was achieved using engineering judgement based on knowledge of the area, urban area land use and general attractiveness of each zone.

Model Calibration

A traffic model is used to predict the traffic on a street system at some future point in time. Therefore, the model must duplicate the existing traffic pattern. The actual calibration of the model is an interactive process in which incremental changes are made either in the trip generation, trip distribution, or the through trips. The purpose of each change is to allow the model to more accurately reflect the real world conditions upon which it is based. Only when the model can adequately reflect the existing traffic pattern should it be used to predict traffic in the future. The model was calibrated using 1993-94 Average Daily Traffic Counts on all routes that